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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/862,968	05/22/2001	John Andrew Aiken JR.	5577-233	9829
20792	7590	01/19/2006	EXAMINER	
MYERS BIGEL SIBLEY & SAJOVEC PO BOX 37428 RALEIGH, NC 27627			VU, VIET DUY	
			ART UNIT	PAPER NUMBER
			2154	
DATE MAILED: 01/19/2006				

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	09/862,968	AIKEN ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Viet Vu	2154	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 07 November 2005.
- 2a) This action is **FINAL**.                            2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 1-47 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) Claim(s) 12,25-27,31,33 and 35 is/are allowed.
- 6) Claim(s) 1-11,13-17,21-24,28-30,32,34 and 36-47 is/are rejected.
- 7) Claim(s) 18-20 is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
  - a) All    b) Some \* c) None of:
    1. Certified copies of the priority documents have been received.
    2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
    3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- 1) Notice of References Cited (PTO-892)
- 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 4) Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) Notice of Informal Patent Application (PTO-152)
- 6) Other: \_\_\_\_\_.

1. In view of the Appeal Brief filed on November 7, 2005, PROSECUTION IS HEREBY REOPENED. A new ground of rejection is set forth below.

To avoid abandonment of the application, appellant must exercise one of the following two options:

(1) file a reply under 37 CFR 1.111 (if this Office action is non-final) or a reply under 37 CFR 1.113 (if this Office action is final); or,

(2) initiate a new appeal by filing a notice of appeal under 37 CFR 41.31 followed by an appeal brief under 37 CFR 41.37. The previously paid notice of appeal fee and appeal brief fee can be applied to the new appeal. If, however, the appeal fees set forth in 37 CFR 41.20 have been increased since they were previously paid, then appellant must pay the difference between the increased fees and the amount previously paid.

A Supervisory Patent Examiner (SPE) has approved of reopening prosecution by signing below:



JOHN FOLLANSBEE  
SUPERVISORY PATENT EXAMINER  
TECHNOLOGY CENTER 2100

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**Art Rejections:**

2. The text of 35 U.S.C. 103(a) not cited here can be found in the previous office action.

3. Claims 1-11, 13-17, 21-24, 28-30, 32, 34 and 36-47 are rejected under 35 U.S.C. 103(a) as being unpatentable over Howes, U.S. pat. No. 6,324,177.

Per claim 1, Howes discloses a system and method for assigning a port for a connection originated by one of multiple application instances comprising:

a) providing multiple available real ports for each common virtual network address of the virtual server to each of the different client data processing systems executing multiple application instances (see col 4, lines 37-39);

b) selecting a port identified as available as the port for the connection utilizing the common virtual network address (see col 4, lines 39-42).

Howes does not explicitly teach providing an indicator for indicating availability of the (virtual) ports to the client. It is noted that for TCP/IP communications, it is required that IP address and port ID of virtual server be known to the client before connection can be established (see col 4, lines 27-37).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to utilize any conventional means in Howes to indicate the available ports and common IP addresses for the virtual servers to the clients because it would have enabled establishing connections between clients and servers (see col 4, lines 36-37).

Per claims 2 and 4-5, Howes teaches maintaining identifications of available ports and assigned ports associated with existing connections in a memory (see col 6, lines 36-58).

Per claims 3 and 6, Howes teaches using the common virtual IP address as the source address in inbound communications from the virtual server to a real machine and outbound communications from the virtual server to the client (see col 10, lines 1-15). It is also noted that in many applications, the same application instances are executed on both server and client, e.g., emails.

Per claim 7, Howes teaches that the real port or machine can be selected based upon connections originated by certain application instances (see col 4, lines 48-52). Howes also teaches indicating operational states of the virtual machines, e.g., available, unavailable, etc., (see col 7, lines 29-35).

Per claim 8, Howes does not explicitly teach terminating a connection to a selected port. An official notice is taken that it is well known in the art to perform such connection termination step for each failed or complete session because it would have allowed the system to reclaim its resources. It would have been obvious to one of ordinary skill in the art to utilize such connection termination step in Howes because it would have enabled the system to properly manage its resources.

Per claim 9, it would have been further obvious to one skilled in the art that Howes' invention would have been applicable to any conventional data computing systems.

Per claims 10-11, an official notice is also taken that the port selection and address translation processes are typically performed at TCP/IP stacks. It would have been obvious to one skilled in the art to realize such TCP/IP stack at the virtual machine (coupling facility) for performing port selection and address translation (see col 4, lines 37-42).

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Claims 13-17, 21-24, 28-30, 32, 34 and 36-47 are similar in scope as that of claims 1-11 and hence are rejected for the same rationale set forth above for claims 1-11.

**Allowable Subject Matter:**

4. Claims 18-20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
  
5. Claims 12, 25-27, 31, 33 and 35 are allowed over prior art of record.

**Response to Arguments:**

6. Applicant's arguments filed on 11/7/2005 with respect to claims 1-11, 13-17, 21-24, 28-30, 32, 34 and 36-47 are moot in view of new ground of rejection set forth above.

**Conclusion:**

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Viet Vu whose telephone number is 571-272-3977. The examiner can normally be reached on Monday through Friday from 7:00am to 4:00pm. The Group general information number is 571-272-2100. The Group fax number is 571-273-8300.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Follansbee, can be reached on 571-272-3964.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>.

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Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



VIET D. VU  
PRIMARY EXAMINER

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1/17/06